

Title	Pesticides
Specimen Requirements	<p>Samples for Pesticide analysis will only be accepted from the Indiana State Department of Health and other government agencies.</p> <p>Contact: Mark Starzynski 921-5580 for sample containers and instructions.</p>
Sampling Materials	<p>Water must be collected in one liter glass bottles with teflon lined caps, both of which were previously rinsed with solvents. Solids are collected in solvent rinsed pint glass jars with clean aluminum foil between the jar and the cap.</p>
Procedural Notes	<p>Sample Collection -- When sampling from a water tap, open the tap and allow the system to flush until the water temperature has stabilized (usually about two minutes). Adjust the flow to about 500mL/min. and collect samples from the flowing stream. Keep samples sealed from collection time until analysis. When sampling from an open body of water, fill the sample container with water from a representative area. Sampling equipment, including automatic samplers, must be free of plastic tubing, gaskets, and other parts that may leach interfering analytes into the water sample. Automatic samplers that composite samples over time should use refrigerated glass sample containers if possible.</p> <p>Sample Dechlorination and Preservation -- All samples should be iced or refrigerated at 4 C and kept in the dark from the time of collection until extraction. Residual chlorine should be reduced at the sampling site by addition of 40-50mg of sodium sulfite (this may be added as a solid with stirring or shaking until dissolved) to each water sample. It is very important that the sample be dechlorinated prior to adding acid to lower the pH of the sample. Adding sodium sulfite and hydrochloric acid to the sample bottles prior to shipping to the sampling site is not permitted. Hydrochloric acid should be used at the sampling site to retard the microbiological degradation of some analytes in water. The sample pH is adjusted to <2 with 6 N hydrochloric acid. This is the same pH used in the extraction, and is required to support the recovery of acidic compounds like pentachlorophenol.</p> <p>If Cyanazine is to be determined, a separate sample must be collected. Cyanazine degrades in the sample when it is stored under acidic conditions or when sodium sulfite is present in the stored sample. Samples collected for Cyanazine determination MUST NOT be dechlorinated or acidified when collected. They should be iced or refrigerated as described above and analyzed within 14 days. However, these samples MUST be dechlorinated and acidified immediately prior to fortification with internal standards and surrogates, and extraction using the same quantities of acid and sodium sulfite described above.</p> <p>Prometon is not efficiently extracted from water at pH 2 due to what appears to be its ionization in solution under acidic conditions. In order to determine this analyte accurately, a separate sample must be collected and dechlorinated with sodium sulfite, but no acid should be added. At neutral pH, this compound is recovered from water with efficiency greater than 90%. Water --- fill 2 of the one liter glass bottles to the top. Solid ---- fill 1 or 2 of the pint glass jars with the solid.</p>
Shipping Instructions	<p>Samples must be kept refrigerated to 4 C from the time of collection to the time of analysis. All samples must be extracted within seven days of collection and completely analyzed within forty days of extraction.</p>
Reporting and TAT	